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(541) 383-9310 FAX 382-7588

Work Order #: M107004

CLIENT: BRISTOL				INVOICE TO: BRISTOL				TURNAROUND REQUEST in Business Days*			
REPORT TO: ANNE KRANAWETTER								Organic & Inorganic Analyses			
ADDRESS: AMCHITKA ISLAND, AK								10 7 5 4 3 2 1 <1			
PHONE: 907-770-0974 FAX: 770-0975				P.O. NUMBER: 21090				STD. Petroleum Hydrocarbon Analyses			
PROJECT NAME: AMCHITKA				REQUESTED ANALYSES				5 4 3 2 1 <1			
PROJECT NUMBER: 21090								STD. Please Specify			
SAMPLED BY:								OTHER			
CLIENT SAMPLE IDENTIFICATION				SAMPLING DATE/TIME				MATRIX (W, S, O)			
								# OF CONT.			
								COMMENTS			
								NCA WORK ID			
1. 01AMHV12SL 7/2/01 1537				✓ ✓ ✓ ✓				S 2 01AMHV101SL			
2. 01AMHV13SL 7/2/01 1542				✓ ✓ ✓ ✓				S 2 01AMHV102SL			
3. 01AMHV14SL 7/2/01 1545				✓ ✓ ✓ ✓				S 2 01AMHV103SL			
4. 01AMHV15SL 7/2/01 1549				✓ ✓ ✓ ✓				S 2 01AMHV104SL			
5. 01AMHV16SL 7/2/01 1551				✓ ✓ ✓ ✓				S 2 01AMHV105SL			
6.											
7.											
8. Sample ids returned 01AMHV101SL - 055L											
9.											
10.											
11.											
12.											
13.											
14.											
15.											
RELINQUISHED BY: [Signature]				DATE: 7/2/01				RECEIVED BY: [Signature]			
PRINT NAME: [Signature]				FIRM: BRISTOL				PRINT NAME: [Signature]			
RELINQUISHED BY:				DATE:				RECEIVED BY:			
PRINT NAME:				FIRM:				PRINT NAME:			
ADDITIONAL REMARKS: HAVE Unit Post Treatment for Batch #1								TEMP: PAGE OF			



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541.383.9310 fax 541.382.7588

7 December, 2001

Anne Kranawetter
Bristol Environmental & Engineering
2000 W International Airport C#1
Anchorage, AK 99502-1116

RE: Amchitka

Enclosed are the results of analyses for samples received by the laboratory on 07/02/01 18:14. If you have any questions concerning this report, please feel free to contact me.

This report was recreated from a previously issued final report in order to provide an electronic copy. The final report used for these electronic copies may have been previously issued as an amended report due to client requested changes to sample names, etc. No data has changed since submission of the previously issued final, or amended, report.

Sincerely,

Stephen Wilson
Environmental Group Leader

Work Orders included in this report:

M107004



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Bristol Environmental & Engineering
2000 W International Airport C#1
Anchorage, AK 99502-1116

Project: Amchitka
Project Number: 21090
Project Manager: Anne Kranawetter

Reported:
10/25/01 01:31

ANALYTICAL REPORT FOR SAMPLES

Sample ID	Laboratory ID	Matrix	Date Sampled	Date Received
01AMHV101SL	M107004-01	Soil	07/02/01 15:37	07/02/01 18:14
01AMHV102SL	M107004-02	Soil	07/02/01 15:42	07/02/01 18:14
01AMHV103SL	M107004-03	Soil	07/02/01 15:45	07/02/01 18:14
01AMHV104SL	M107004-04	Soil	07/02/01 15:49	07/02/01 18:14
01AMHV105SL	M107004-05	Soil	07/02/01 15:51	07/02/01 18:14

COC #137

North Creek Analytical - Mobile Lab

Stephen Wilson, Environmental Group Leader

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Bristol Environmental & Engineering
2000 W International Airport C#1
Anchorage, AK 99502-1116

Project: Amchitka
Project Number: 21090
Project Manager: Anne Kranawetter

Reported:
10/25/01 01:31

Gasoline Range Organics (n-Hexane to <n-Decane) per AK101
North Creek Analytical - Mobile Lab

Analyte	Result	Reporting Limit	Units	Dilution	Method	Prepared	Analyzed	Batch	Notes
01AMHV101SL (M107004-01) Soil					Sampled: 07/02/01 Received: 07/02/01				
Gasoline Range Organics	ND	10.2	mg/kg dry	50	AK 101	07/03/01	07/03/01	0107013	
Surr: 4-BFB (FID)	81.2 %	50-150							
01AMHV102SL (M107004-02) Soil					Sampled: 07/02/01 Received: 07/02/01				
Gasoline Range Organics	ND	7.35	mg/kg dry	50	AK 101	07/03/01	07/03/01	0107013	
Surr: 4-BFB (FID)	89.8 %	50-150							
01AMHV103SL (M107004-03) Soil					Sampled: 07/02/01 Received: 07/02/01				
Gasoline Range Organics	ND	7.80	mg/kg dry	50	AK 101	07/03/01	07/03/01	0107013	
Surr: 4-BFB (FID)	78.7 %	50-150							
01AMHV104SL (M107004-04) Soil					Sampled: 07/02/01 Received: 07/02/01				
Gasoline Range Organics	ND	7.53	mg/kg dry	50	AK 101	07/03/01	07/03/01	0107013	
Surr: 4-BFB (FID)	78.8 %	50-150							
01AMHV105SL (M107004-05) Soil					Sampled: 07/02/01 Received: 07/02/01				
Gasoline Range Organics	9.16	7.36	mg/kg dry	50	AK 101	07/03/01	07/03/01	0107013	
Surr: 4-BFB (FID)	87.7 %	50-150							

North Creek Analytical - Mobile Lab

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Anchorage, AK 99502-1116

Project: Amchitka
Project Number: 21090
Project Manager: Anne Kranawetter

Reported:
10/25/01 01:31

Diesel Hydrocarbons (C10-C25) and Heavy Oil (C25-C36) per AK102 and AK103
North Creek Analytical - Mobile Lab

Analyte	Result	Reporting Limit	Units	Dilution	Method	Prepared	Analyzed	Batch	Notes
01AMHV101SL (M107004-01) Soil					Sampled: 07/02/01 Received: 07/02/01				
Residual Range Organics	ND	300	mg/kg dry	1	AK102/103	07/03/01	07/03/01	0107015	
Diesel Range Organics	322	150	"	"	"	"	"	"	D-16
<i>Surr: 1-Chlorooctadecane</i>	85.4 %	50-150							
<i>Surr: Triacontane</i>	84.5 %	50-150							
01AMHV102SL (M107004-02) Soil					Sampled: 07/02/01 Received: 07/02/01				
Residual Range Organics	ND	300	mg/kg dry	1	AK102/103	07/03/01	07/03/01	0107015	
Diesel Range Organics	261	150	"	"	"	"	"	"	
<i>Surr: 1-Chlorooctadecane</i>	86.9 %	50-150							
<i>Surr: Triacontane</i>	93.8 %	50-150							
01AMHV103SL (M107004-03) Soil					Sampled: 07/02/01 Received: 07/02/01				
Residual Range Organics	ND	300	mg/kg dry	1	AK102/103	07/03/01	07/03/01	0107015	
Diesel Range Organics	ND	150	"	"	"	"	"	"	
<i>Surr: 1-Chlorooctadecane</i>	85.1 %	50-150							
<i>Surr: Triacontane</i>	88.9 %	50-150							
01AMHV104SL (M107004-04RE1) Soil					Sampled: 07/02/01 Received: 07/02/01				
Residual Range Organics	ND	300	mg/kg dry	1	AK102/103	07/03/01	07/03/01	0107015	
Diesel Range Organics	168	150	"	"	"	"	"	"	D-16
<i>Surr: 1-Chlorooctadecane</i>	86.8 %	50-150							
<i>Surr: Triacontane</i>	92.0 %	50-150							
01AMHV105SL (M107004-05) Soil					Sampled: 07/02/01 Received: 07/02/01				
Residual Range Organics	ND	300	mg/kg dry	1	AK102/103	07/03/01	07/03/01	0107015	
Diesel Range Organics	ND	150	"	"	"	"	"	"	
<i>Surr: 1-Chlorooctadecane</i>	87.5 %	50-150							
<i>Surr: Triacontane</i>	94.1 %	50-150							

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Stephen Wilson, Environmental Group Leader

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Bristol Environmental & Engineering
2000 W International Airport C#1
Anchorage, AK 99502-1116

Project: Amchitka
Project Number: 21090
Project Manager: Anne Kranawetter

Reported:
10/25/01 01:31

BTEX, MTBE and Naphthalene per EPA Method 8021B
North Creek Analytical - Mobile Lab

Analyte	Result	Reporting Limit	Units	Dilution	Method	Prepared	Analyzed	Batch	Notes
01AMHV101SL (M107004-01) Soil					Sampled: 07/02/01 Received: 07/02/01				
Benzene	ND	0.0635	mg/kg dry	50	1B BTEX/MTI	07/03/01	07/03/01	0107013	
Toluene	ND	0.254	"	"	"	"	"	"	
Ethylbenzene	ND	0.254	"	"	"	"	"	"	
Xylenes (total)	ND	0.508	"	"	"	"	"	"	
Naphthalene	ND	2.54	"	"	"	"	"	"	
<i>Surr: 4-BFB</i>	80.1 %	50-150							
01AMHV102SL (M107004-02) Soil					Sampled: 07/02/01 Received: 07/02/01				
Benzene	ND	0.0459	mg/kg dry	50	1B BTEX/MTI	07/03/01	07/03/01	0107013	
Toluene	ND	0.184	"	"	"	"	"	"	
Ethylbenzene	ND	0.184	"	"	"	"	"	"	
Xylenes (total)	ND	0.367	"	"	"	"	"	"	
Naphthalene	ND	1.84	"	"	"	"	"	"	
<i>Surr: 4-BFB</i>	93.8 %	50-150							
01AMHV103SL (M107004-03) Soil					Sampled: 07/02/01 Received: 07/02/01				
Benzene	ND	0.0487	mg/kg dry	50	1B BTEX/MTI	07/03/01	07/03/01	0107013	
Toluene	ND	0.195	"	"	"	"	"	"	
Ethylbenzene	ND	0.195	"	"	"	"	"	"	
Xylenes (total)	ND	0.390	"	"	"	"	"	"	
Naphthalene	ND	1.95	"	"	"	"	"	"	
<i>Surr: 4-BFB</i>	83.1 %	50-150							
01AMHV104SL (M107004-04) Soil					Sampled: 07/02/01 Received: 07/02/01				
Benzene	ND	0.0471	mg/kg dry	50	1B BTEX/MTI	07/03/01	07/03/01	0107013	
Toluene	ND	0.188	"	"	"	"	"	"	
Ethylbenzene	ND	0.188	"	"	"	"	"	"	
Xylenes (total)	ND	0.377	"	"	"	"	"	"	
Naphthalene	ND	1.88	"	"	"	"	"	"	
<i>Surr: 4-BFB</i>	75.6 %	50-150							

North Creek Analytical - Mobile Lab

Stephen Wilson, Environmental Group Leader

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Project: Amchitka
Project Number: 21090
Project Manager: Anne Kranawetter

Reported:
10/25/01 01:31

BTEX, MTBE and Naphthalene per EPA Method 8021B
North Creek Analytical - Mobile Lab

Analyte	Result	Reporting Limit	Units	Dilution	Method	Prepared	Analyzed	Batch	Notes
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01AMHV105SL (M107004-05) Soil

Sampled: 07/02/01 Received: 07/02/01

Benzene	ND	0.0460	mg/kg dry	50	1B BTEX/MTI	07/03/01	07/03/01	0107013	
Toluene	ND	0.184	"	"	"	"	"	"	
Ethylbenzene	ND	0.184	"	"	"	"	"	"	
Xylenes (total)	ND	0.368	"	"	"	"	"	"	
Naphthalene	ND	1.84	"	"	"	"	"	"	

Surr: 4-BFB 99.6 % 50-150

North Creek Analytical - Mobile Lab

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Reported:
10/25/01 01:31

Physical Parameters per APHA/ASTM/EPA Methods
North Creek Analytical - Mobile Lab

Analyte	Result	Reporting Limit	Units	Dilution	Method	Prepared	Analyzed	Batch	Notes
01AMHV101SL (M107004-01) Soil					Sampled: 07/02/01 Received: 07/02/01				
% Solids	88.4	0.0100 % by Weight		1	Gravimetric	07/03/01	07/04/01	0107020	
01AMHV102SL (M107004-02) Soil					Sampled: 07/02/01 Received: 07/02/01				
% Solids	95.5	0.0100 % by Weight		1	Gravimetric	07/03/01	07/04/01	0107020	
01AMHV103SL (M107004-03) Soil					Sampled: 07/02/01 Received: 07/02/01				
% Solids	90.3	0.0100 % by Weight		1	Gravimetric	07/03/01	07/04/01	0107020	
01AMHV104SL (M107004-04) Soil					Sampled: 07/02/01 Received: 07/02/01				
% Solids	89.0	0.0100 % by Weight		1	Gravimetric	07/03/01	07/04/01	0107020	
01AMHV105SL (M107004-05) Soil					Sampled: 07/02/01 Received: 07/02/01				
% Solids	96.0	0.0100 % by Weight		1	Gravimetric	07/03/01	07/04/01	0107020	

North Creek Analytical - Mobile Lab

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Bristol Environmental & Engineering
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Anchorage, AK 99502-1116

Project: Amchitka
Project Number: 21090
Project Manager: Anne Kranawetter

Reported:
10/25/01 01:31

Gasoline Range Organics (n-Hexane to <n-Decane) per AK101 - Quality Control

North Creek Analytical - Mobile Lab

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC Limits	RPD	RPD Limit	Notes
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Batch 0107013 - MeOH Extraction

Blank (0107013-BLK1)

Prepared & Analyzed: 07/03/01

Gasoline Range Organics ND 4.00 mg/kg wet

Surr: 4-BFB (FID) 2.20 " 2.50 88.0 50-150

LCS (0107013-BS2)

Prepared & Analyzed: 07/03/01

Gasoline Range Organics 29.4 4.00 mg/kg wet 25.0 118 50-150

Surr: 4-BFB (FID) 8.92 " 10.0 89.2 50-150

North Creek Analytical - Mobile Lab

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Anchorage, AK 99502-1116

Project: Amchitka
Project Number: 21090
Project Manager: Anne Kranawetter

Reported:
10/25/01 01:31

Diesel Hydrocarbons (C10-C25) and Heavy Oil (C25-C36) per AK102 and AK103 - Quality Control

North Creek Analytical - Mobile Lab

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC Limits	RPD	RPD Limit	Notes
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Batch 0107015 - 3545 ASE

Blank (0107015-BLK1)

Prepared & Analyzed: 07/03/01

Residual Range Organics	ND	300	mg/kg wet
Diesel Range Organics	ND	150	"

<i>Surr: 1-Chlorooctadecane</i>	<i>18.8</i>	<i>"</i>	<i>23.7</i>	<i>79.3</i>	<i>50-150</i>
<i>Surr: Triacontane</i>	<i>20.1</i>	<i>"</i>	<i>23.5</i>	<i>85.5</i>	<i>50-150</i>

LCS (0107015-BS1)

Prepared & Analyzed: 07/03/01

Diesel Range Organics	1400	150 mg/kg wet	1250	112	75-125
<i>Surr: 1-Chlorooctadecane</i>	23.0	"	23.7	97.0	50-150
<i>Surr: Triacontane</i>	21.1	"	23.5	89.8	50-150

LCS (0107015-BS2)

Prepared & Analyzed: 07/03/01

Residual Range Organics	671	300 mg/kg wet	625	107	60-120
<i>Surr: 1-Chlorooctadecane</i>	20.4	"	23.7	86.1	50-150
<i>Surr: Triacontane</i>	23.2	"	23.5	98.7	50-150

LCS Dup (0107015-BSD1)

Prepared & Analyzed: 07/03/01

Diesel Range Organics	1370	150 mg/kg wet	1250	110	75-125	2.17	20
<i>Surr: 1-Chlorooctadecane</i>	<i>18.9</i>	<i>"</i>	<i>23.7</i>	<i>79.7</i>	<i>50-150</i>		
<i>Surr: Triacontane</i>	<i>21.4</i>	<i>"</i>	<i>23.5</i>	<i>91.1</i>	<i>50-150</i>		

LCS Dup (0107015-BSD2)

Prepared & Analyzed: 07/03/01

Residual Range Organics	617	300 mg/kg wet	625	98.7	60-120	8.39	25
<i>Surr: 1-Chlorooctadecane</i>	18.2	"	23.7	76.8	50-150		
<i>Surr: Triacontane</i>	20.3	"	23.5	86.4	50-150		

Matrix Spike (0107015-MS1)

Source: M107004-01

Prepared & Analyzed: 07/03/01

Diesel Range Organics	2050	150	mg/kg dry	1370	322	126	0-200
<i>Surr: 1-Chlorooctadecane</i>	<i>26.1</i>	<i>"</i>		<i>25.9</i>		<i>101</i>	<i>50-150</i>
<i>Surr: Triacontane</i>	<i>23.1</i>	<i>"</i>		<i>25.7</i>		<i>89.9</i>	<i>50-150</i>

North Creek Analytical - Mobile Lab

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Project: Amchitka
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10/25/01 01:31

Diesel Hydrocarbons (C10-C25) and Heavy Oil (C25-C36) per AK102 and AK103 - Quality Control

North Creek Analytical - Mobile Lab

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC Limits	RPD	RPD Limit	Notes
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Batch 0107015 - 3545 ASE

Matrix Spike (0107015-MS2)

Source: M107004-02

Prepared & Analyzed: 07/03/01

Residual Range Organics	572	300	mg/kg dry	670	ND	81.4	0-200		
Surr: 1-Chlorooctadecane	18.5		"	25.4		72.8	50-150		
Surr: Triacontane	20.2		"	25.2		80.2	50-150		

North Creek Analytical - Mobile Lab

Stephen Wilson, Environmental Group Leader

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Bristol Environmental & Engineering
2000 W International Airport C#1
Anchorage, AK 99502-1116

Project: Amchitka
Project Number: 21090
Project Manager: Anne Kranawetter

Reported:
10/25/01 01:31

BTEX, MTBE and Naphthalene per EPA Method 8021B - Quality Control

North Creek Analytical - Mobile Lab

Analyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC Limits	RPD	RPD Limit	Notes
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Batch 0107013 - MeOH Extraction

Blank (0107013-BLK1)

Prepared & Analyzed: 07/03/01

Benzene	ND	0.0250	mg/kg wet
Toluene	ND	0.100	"
Ethylbenzene	ND	0.100	"
Xylenes (total)	ND	0.200	"
Naphthalene	ND	1.00	"

Surr: 4-BFB 2.31 " 2.50 92.4 50-150

LCS (0107013-BS1)

Prepared & Analyzed: 07/03/01

Benzene	1.99	0.0250	mg/kg wet	2.50	79.6	69-138
Toluene	2.16	0.100	"	2.50	86.4	53-151
Ethylbenzene	2.45	0.100	"	2.50	98.0	61-141
Xylenes (total)	7.09	0.200	"	7.50	94.5	62-141
Naphthalene	2.56	1.00	"	2.50	102	65-135

Surr: 4-BFB 2.52 " 2.50 101 50-150

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Reported:
10/25/01 01:31

Notes and Definitions

D-16 Detected hydrocarbons in the diesel do not have a distinct diesel pattern and may be due to heavily weathered diesel.

DET Analyte DETECTED

ND Analyte NOT DETECTED at or above the reporting limit

NR Not Reported

dry Sample results reported on a dry weight basis. MRLs are adjusted if %Solids are less than 50%.

wet Sample results reported on a wet weight basis (as received)

RPD Relative Percent Difference

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Items for Project Manager Review

LabNumber	Analysis	Analyte	Exception
			Report recreated from: \\sisters\elmnt\Report\M107004 FINAL 10 25 01 0131.mdb
			Default Report (not modified)
0107013-BLK1	AK101 (GRO)	Gasoline Range Organics	Additional analyte reported
0107013-BS2	AK101 (GRO)	Gasoline Range Organics	Additional analyte reported
0107015-BLK1	AK102/103	Residual Range Organics	Additional analyte reported
0107015-BS2	AK102/103	Residual Range Organics	Additional analyte reported
0107015-BSD2	AK102/103	Residual Range Organics	Additional analyte reported
0107015-MS2	AK102/103	Residual Range Organics	Additional analyte reported
M107004-01	AK101 (GRO)	Gasoline Range Organics	Additional analyte reported
M107004-01	AK102/103	Diesel Range Organics	D-16
M107004-01	AK102/103	Residual Range Organics	Additional analyte reported
M107004-02	AK101 (GRO)	Gasoline Range Organics	Additional analyte reported
M107004-02	AK102/103	Residual Range Organics	Additional analyte reported
M107004-03	AK101 (GRO)	Gasoline Range Organics	Additional analyte reported
M107004-03	AK102/103	Residual Range Organics	Additional analyte reported
M107004-04	AK101 (GRO)	Gasoline Range Organics	Additional analyte reported
M107004-04RE1	AK102/103	Residual Range Organics	Additional analyte reported
M107004-04RE1	AK102/103	Diesel Range Organics	D-16
M107004-05	AK101 (GRO)	Gasoline Range Organics	Additional analyte reported
M107004-05	AK102/103	Residual Range Organics	Additional analyte reported